

Amendments to the Claims:

The listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

1.-16. (Cancelled)

17. (Currently Amended) A cast ~~aluminium~~ aluminum alloy, wherein the alloy comprises
~~1.0-8.0~~ 3.0-6.0 % by weight magnesium (Mg),
> 1.0 - 4.0 % by weight silicon (Si),
0.01 - < 0.5 % by weight scandium (Sc),
0.005 - 0.2 % by weight titanium (Ti),
~~0.001-0.1~~ 0-0.05 % by weight zinc (Zn)
0 - 0.5 % by weight of at least one ~~[[an]]~~ element ~~or an element group~~ selected from the
group consisting of zirconium (Zr), hafnium (Hf), molybdenum (Mo), terbium (Tb),
niobium (Nb), gadolinium (Gd), erbium (Er) and vanadium (V),
0 - 0.8 % by weight manganese (Mn),
0 - 0.3 % by weight chromium (Cr),
0 - 1.0 % by weight copper (Cu),
0 - 0.6 % by weight iron (Fe),
0 - 0.004 % by weight beryllium (Be),
the remainder being aluminum,
provided that the total amount of impurities is not more than 0.5 % by weight and
provided that no single impurity is present in an amount of more than 0.1 % by weight.

18-19. (Cancelled)

20. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the
alloy contains 1.1 - 4.0 % by weight silicon (Si).

21. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 1.1 - 3.0 % by weight silicon (Si).

22. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.01 - 0.45 % by weight scandium (Sc).

23. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.015 - 0.4 % by weight scandium (Sc).

24. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.01 - 0.2 % by weight titanium (Ti).

25. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.05 - 0.15 % by weight titanium (Ti).

26. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.01 - 0.3 % by weight zirconium (Zr).

27. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.05 - 0.1 % by weight zirconium (Zr).

28. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains at least 0.001 % by weight vanadium (V).

29. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains at least 0.008 % by weight vanadium (V).

30. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains at least 0.001 % by weight gadolinium (Gd).

31. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.001 - 0.3 % by weight chromium (Cr).

32. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.0015 - 0.2 % by weight chromium (Cr).

33. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.001 - 1.0 % by weight copper (Cu).

34. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.5 - 1.0 % by weight copper (Cu).

35. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.001 - 0.05 % by weight zinc (Zn).

36. (Currently Amended) The cast ~~aluminium~~ aluminum alloy according to claim 17, wherein the alloy contains 0.05 - 0.6 % by weight iron (Fe).

37. (Currently Amended) The cast ~~aluminium~~ aluminum alloy according to claim 17, wherein the alloy contains 0.05 - 0.2 % by weight iron (Fe).

38. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains maximally 0.15 % by weight manganese (Mn).

39. (Currently Amended) The cast ~~aluminium~~ aluminum alloy of claim 17, wherein the alloy contains 0.4 - 0.8 % by weight manganese (Mn).

40. (Withdrawn, Previously Presented) A method of producing a cast part said method comprising:
casting a part comprising the alloy of claim 17 and
heat treating the part at a temperature of from 250 - 400°C to produce a thermally stressed cast part.

41. (Withdrawn, Previously Presented) The method of claim 40, wherein said casting

step involves diecasting, sand casting, permanent mold casting, thixocasting, rheocasting or similar casting techniques.

42. (Withdrawn, Previously Presented) The method of claim 40, wherein said part is selected from the group consisting of cylinder heads, crankcases, heat-resistant safety components, air conditioner components and structural airplane components.

43. (Withdrawn, Previously Presented) The method of claim 40, wherein said part is selected from the group consisting of supersonic aircraft components, engine segments and pylons.